

NWS FORM E-5
(11-88)
(PRES. BY WSOM E-41)

U.S. DEPARTMENT OF COMMERCE
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION
NATIONAL WEATHER SERVICE

HYDROLOGIC SERVICE AREA (HSA)

WFO Jackson, Mississippi

MONTHLY REPORT OF RIVER AND FLOOD CONDITIONS

REPORT FOR:

MONTH

YEAR

December

2001

TO: Hydrometeorological Information Center, W/OH2
NOAA / National Weather Service
1325 East West Highway, Room 7230
Silver Spring, MD 20910-3283

SIGNATURE

Jim Stefkovich, MIC
In Charge of HSA

DATE

January 10th , 2002

When no flooding occurs, include miscellaneous river conditions, such as significant rises, record low stages, ice conditions, snow cover, droughts, and hydrologic products issued (WSOME-41)

Several frontal systems pushed across the state during the month. A slow moving frontal system pushed through the HSA between December 8th and 10th. Rainfall amounts were around an inch or less. From December 12th to the 14th, a slow moving frontal system dropped heavy rainfall on areas already saturated from the late November rainfall event. 24 hour rainfall amounts during this event ranged from 2.50 to near 4.75 inches. Heaviest 24 hour rainfall amounts were at Bastrop, LA (4.67 inches), Yazoo City, MS (4.64 inches), Lake Providence, LA (4.55 inches), Portland, AR (4.40 inches), Hattiesburg, MS (4.34 inches).

The final two cold fronts were much faster moving than the first two. A squall line formed ahead of a frontal system pushing through the area from December 16th-17th time frame. Rainfall amounts were an inch or less. A strong, fast moving front pushed through the area on December 22nd bringing with it a much colder and drier air mass. Rainfall amounts were also around an inch or less. Only scattered very light rainfall amounts were noted near the end of the month over southern sections of the HSA.

Wetter than normal soil conditions and heavy mid month rainfall amounts caused significant rises on most rivers especially those affected by heavy rainfall in late November. The Big Sunflower river experienced moderate flooding with the Big Sunflower at Sunflower cresting a little more than ½ foot below its record. The Yalobusha and portions of the lower Yazoo experienced minor to moderate flooding. The Big Black river had moderate to major flooding. Rivers in the upper Pearl River basin had only some minor flooding. In northeast LA, the Boeuf River had minor flooding for most the month. Portions of the Chickasawhay River and Tallahalla Creek had only minor flooding. The remainder of the river had moderate rises below flood stage.

The heavy rainfall event in the middle of the month helped to produce well above normal monthly rainfall totals for southeast Arkansas, northern portions of northeast Louisiana, and the entire Lower Yazoo River basin. The Big Black River basin had near normal to slightly above normal rainfall. Southern and southeastern sections of Mississippi and the southern sections of northeast Louisiana had below to well below normal rainfall for the month.

<u>RIVER BASIN</u>	<u>RAINFALL</u>	<u>DEPARTURE FROM NORMS</u>
Southeast Arkansas (Chicot & Ashley counties)	9.00 to 10.00 inches	Much above normal
northeast Louisiana (Tensas, Boeuf, Bayou Macon & Lower Ouachita)	3.50 to 10.00 inches	Much above normal over north sections and well below normal over southern sections
Lower Yazoo	6.50 to 10.00 inches	Slightly above to much above normal
Big Black	4.50 to 7.50 inches	Below normal over southeast portions of the basin. Normal to slightly above normal over the remainder of the basin.
Homochitto/ Bayou Pierre	4.00 to 5.50 inches	Slightly below to much below normal.
Pearl (abv Jackson)	3.00 to 6.50 inches	Near normal in the upper basin to much below in the southern basin.
Pearl (Blo Jackson)	3.00 to 5.50 inches	Below to much below normal
Pascagoula	3.50 to 6.50 inches	Near Normal over upper Chickasawhay to much below normal elsewhere

The heaviest rainfall amounts in the HSA for the month were 10.10 inches at Elliot, MS; 10.00 inches at Portland, AR; 9.89 inches at Bastrop, LA; 9.82 inches at Eudora, AR; 9.74 inches at Crossett, AR; 9.61 at Greenville, MS and Anguilla, MS.

Here at the WFO, the December monthly rainfall was 4.07 inches, which was -1.84 inches below normal. The corrected rainfall total for the year ending November 30th was 60.15 inch which was 10.69 inches above normal. Our total rainfall for the calendar year 2001 was 64.22 inches, which ends the year 8.83 inches above normal.

The Mississippi River from Arkansas City to Natchez ended the month much higher than the beginning of the month. River stages during the first few days of the month were just below or near seasonal norms; however, for the remainder of the month, river stages were much above the seasonal norms. The provisional high and low stages for December are listed below:

<i>Location</i>	<i>High Stage(ft)</i>	<i>Date</i>	<i>Low Stage(ft)</i>	<i>Date</i>
<i>Arkansas City, AR</i>	<i>29.90</i>	<i>12/26</i>	<i>7.40</i>	<i>12/01</i>
<i>Greenville, MS</i>	<i>41.10</i>	<i>12/26</i>	<i>17.58</i>	<i>12/01</i>
<i>Vicksburg, MS</i>	<i>37.45</i>	<i>12/28</i>	<i>9.43</i>	<i>12/01</i>
<i>Natchez,MS</i>	<i>45.18</i>	<i>12/29</i>	<i>17.13</i>	<i>12/01</i>

Total Flood Warning products issued: 16
Total Flood Statement products issued: 236
Daily Rainfall Products (RRA'S) issued 31
Daily River Forecast Products (RVS'S) issued 31
Daily River Stage products (RVA'S) issued 31

Marty V. Pope
Service Hydrologist

cc: USGS Little Rock District
USGS Ruston District
USCE Mobile District
USCE Vicksburg District
USCE Mississippi Valley Division
USGS Mississippi District
SRH Climate, Weather and Water Division
LMRFC
Pearl River Valley Water Supply District
Hydrologic Information Center
Southern Region Climate Center